

REMARKS

In view of the above amendments and following remarks, reconsideration of the rejections that are contained within the Office Action of December 27, 2007 is respectfully requested.

Rejections Under 35 U.S.C. §112, Second Paragraph

The Examiner's rejection of claim 8 as being indefinite is respectfully traversed based upon the above amendments and following remarks. While it is generally believed and understood that the term "downwardly" has an inherent frame of reference, the Examiner's interpretation is nonetheless correct, and the claim language proposed to be employed above uses language that corresponds exactly to the Examiner's interpretation as set forth in section 3 on page 2 of the Office Action. Thus, no new issue for consideration by the Examiner is raised by this amendment. This language has been employed in amended claim 12, which has now been rewritten into independent form.

Claims 8-11 and 13-16 have been canceled, rendering the rejections of these claims moot. Claim 12 was also rejected as being indefinite in view of the use of the term "fluid" in line 6. The language here has been amended to recite that the communication passage opens in the tangential direction of the interior space "so that any fluid flowing into said interior space . . . does not disturb revolution of the fluid . . . in said interior space." The point of the expression of course is that the communication passage is provided so that if any fluid flows into the interior space, it does not disturb the revolution of the fluid in the interior space. This operation will be discussed in more detail below. However, it is respectfully submitted that the addition of the term "any" makes this limitation quite clear. That is, there is fluid revolved in the interior space, there is fluid in the oil storage chamber, and any fluid that flows from the oil storage chamber into the interior space is such that it does not disturb the revolution of the fluid in the interior space. Of course, at any point in time, it is not exactly the same fluid, which it is why it is believed that the reference now employed is more appropriate than simply referring to "the fluid."

Rejections Based on Prior Art

The Examiner's rejections of claims 8-11 and 13-16 over prior art have been rendered moot by the cancellation of these claims. Such cancellation is without prejudice or disclaimer to the subject matter thereof, and should not signify acquiescence to the positions taken by the Examiner.

Claim 12 has been redrafted into independent form, and claim 12 clearly distinguishes over Kayukawa in view of Hisanaga as applied by the Examiner.

In the present invention, as discussed on pages 7-9 of the specification, a communication passage 57 is provided for communicating between oil-storage chamber 52 and separation chamber 51. Like the feed hole 53, the communication passage 57 is provided eccentrically from the central axis of the separation chamber 51. Thus fluid introduced into separation chamber 51 through the communication passage 57 is guided in a tangential direction with respect to the circular columnar space 49. That is, the fluid flows into the separation chamber 51 along the inner circumference of the circular columnar space 49. Thus, the fluid that flows from oil-storage chamber 52 into separation chamber 51 through the communication passage 57 smoothly converges with the refrigerant gas fluid that is being revolved in the separation chamber. Thus, the disturbance of the revolving refrigerant gas fluid can be suppressed.

In operation, the communication passage 57 functions as a gas vent hole for fluid such as refrigerant gas that may gather in the upper part of the oil-storage chamber 52. Accordingly, the oil level of the lubricating oil that is in the oil-storage chamber 52 can be pushed up smoothly. Because of the presence of the communication passage 57, blow-back from oil discharge hole 54 due to pulsation of refrigerant gas can be suppressed. This helps to suppress the scattering of oil that collects on the lower part of the separation chamber 51 because of such blow-back.

Claim 12 requires the features of claim 8, including the separation chamber, the exhaust hole for exhausting the fluid that is compressed by the compressing mechanism after having been revolved in the interior space as well as the feed hole for introducing into the interior space the fluid in a direction downwardly and away from the exhaust hole. It further requires the oil-storage chamber for storing the lubricating oil that has been separated from the fluid revolved in the interior space. It further requires the above-described communication passage, recited as being provided

between an upper part of the oil-storage chamber and the interior space. Claim 12 further recites that the communication passage opens in a tangential direction of the interior space so that any fluid flowing into the interior space through the communication passage from the upper part of the oil-storage chamber does not disturb revolution of the fluid in the interior space. This combination of features is not disclosed or suggested by either Kayukawa or Hisanaga.

In rejecting claim 12 over this combination of references, the Examiner initially noted that Kayukawa does not teach an oil-storage chamber or a communication passage between such an oil-storage chamber and the interior space of the separation chamber. In fact, what Kayukawa does is send the pressurized refrigerant through passage 18a into separation chamber 49. The lighter gas is discharged through central passage 51. The separated oil in separation chamber 49 is drawn to crank chamber 15 through the supply passage 31 so that the oil is delivered between pistons 22 and shoes 23, and between shoes 23 and the swash plate 20. Note the discussion in the first complete paragraph in column 6 of Kayukawa.

Hisanaga is directed to a scroll type compressor having an oil-separating chamber 121 formed as a columnar cavity. Refrigerant flows therein through an entrance passage 122. An oil outlet passage 123 permits delivery of the oil component from the oil-separating chamber 121 into oil-storing chamber 130.

The Examiner cited the oil outlet passage 123 as the communication passage required by claim 12. However, the passage 123 is the actual main outlet hole that is used for channeling oil all of the time. There is in fact no communication passage as in the present invention.

Further, even if the communication passage of claim 12 is compared to that of Hisanaga, claim 12 requires that the communication passage open in a tangential direction of the interior space so that any fluid flowing into the interior space through the communication passage, from the upper part of the oil-storage chamber, does not disturb revolution of the fluid. The Examiner states that this is the case in Hisanaga, but it is in fact not the case.

While in Hisanaga, the communication passage 123 is tangential to the chamber 121, as can be seen from Figs. 15 and 16, for example, it is arranged in a manner so that if any fluid were flowing from the oil chamber 130 back to the chamber 121, it would be against the revolution of the

fluid; this can be clearly seen from Fig. 15. Thus, it would disturb the revolution of the fluid. Thus, Hisanaga does not have a passage that opens in a tangential direction so that fluid flowing into the interior space from the upper part of the oil-storage chamber does not disturb revolution of the fluid.

It should be further noted that it is far from clear whether it would have been obvious to one of ordinary skill in the art to have attempted to incorporate an oil-storage chamber with Kayukawa given that Kayukawa already has passage 31 employed in operation with valve 32 to re-supply chamber 15.

Regarding Kayukawa again, it is incidentally noted that the Examiner took the position that Kayukawa teaches a passage 18a for supplying compressed fluid to the feed hole, the passage being directed in a direction downwardly away from the exhaust hole. However, it seems rather clear in Kayukawa that passage 18a is directed upwardly toward chamber 51, and thus upwardly toward exhaust hole 51. See Fig. 1. There is no feed hole as required by claim 8.

In any case, the combination of claims 8 and 12 even further defines over both Kayukawa and Hisanaga, as discussed above. Accordingly, indication of the allowability of this claim is requested.

It is noted that the above proposed amendments present no new issues for consideration by the Examiner, as the proposed amendment combines claims 8 and 12, which subject matter has already been considered. Further, the proposed change to the language of claim 8 is in accordance with the Examiner's previous interpretation, and thus is also a matter which has already been considered by the Examiner. As such, the amendment should clearly be entered and such is further requested.

In view of the above amendments and remarks, it is submitted that the present application is now in condition for allowance, and the Examiner is requested to pass the case to issue. If the Examiner should have any comments or suggestions to help speed the prosecution of this application, the Examiner is requested to contact Applicants' undersigned representative.

Respectfully submitted,

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